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Amendments to the Specification

Please modify the paragraph at page 9, lines 13-18, in the following manner:

In the two- or three-dimensional dynamic measurement using the contrast medium, too, the image reliably catching the desired time phase can be acquired easily [[ad]] and instantaneously. In contrast medium MRA, in particular, the two-or three-dimensional blood vessel image can be easily acquired.

Please modify the paragraph at page 14, lines 3-16, in the following manner:

The transmission system 5 irradiates the radio frequency magnetic field to generate the nuclear magnetic resonance in the atomic nuclei of the atoms constituting the living body tissue of the subject 1, and includes a radio frequency oscillator 11, a modulator 12, a radio frequency amplifier 13 and a radio frequency coil 14a on the transmission side. The radio frequency pulses outputted from the radio frequency oscillator 11 are amplitude-modulated by the modulator 12 in accordance with the instruction of the sequencer [[7]] 4 and after being amplified by the radio frequency amplifier 13, the radio frequency pulses so amplitude-modulated are supplied to the radio frequency coil 14a arranged in the proximity of the subject 1 so that the electromagnetic waves can be irradiated to the subject 1.

Please modify the paragraph at page 21, lines 1-5, in the following manner:

Fig. 2 shows an example of the first embodiment. Fig. 2 shows the mode of the time change of the time phase evaluation value (102) by the three-dimensional dynamic measurement by using the MRI apparatus described already and an example of the measurement sequence of each measurement area divided.

Please modify the paragraph bridging pages 23 and 24, in the following manner:

As shown in Fig. 2(b), for example, the measurement sequence is changed so that the high repetitive-frequency measurement area B(170) can be again measured in

match with the start timing 120 of the artery phase immediately after the measurement of the high repetitive-frequency measurement area B(156). By taking into consideration the fact that the low repetitive-frequency measurement area A(155) exists immediately before B(156), the other low frequency measurement area C(171) is then measured. Subsequently, each measurement area B(172), A(173) ... is serially measured in the same sequence pattern as (a). Therefore, the time phase evaluation values practically measured after the time phase evaluation value 112 are 113, 115...and the time phase evaluation values 114 and 116 that should be originally measured are not measured in practice.. Next, A(156) B(156) and C(171) that are time-wise closest to B(170) as the center, that is, [A(155), B(170), C(171)], are selected as the set for image reconstruction and the image at the start timing 120 of the artery phase is reconstructed by extracting their k space data.

Please modify the paragraph bridging pages 26 and 27, in the following manner:

Next, decision of the artery phase after the dynamic measurement described above is finished will be explained with reference to Fig. 3. Fig. 3 shows an example where the dynamic measurement is made under the same condition as in Fig. 2 and the measurement result and the image are displayed. Fig. 3a shows a graph 201 of a plot of the time phase evaluation value acquired in the measurement sequence of each measurement area shown in Fig. 2(b) and its signal intensity change curve 104, and the measurement sequence and the measurement period of each measurement area with the time axis being in common with that of the graph 201. Each measurement area is represented by a rectangle and the length in the time axis direction (horizontal direction) represents the measurement period. On the other hand, the length in the signal intensity direction (vertical direction) does not have specific meaning but is desirably a suitable length for easy viewing. Fig. 3b shows an example by combining the graph 201 shown in Fig. 3a, the projection image of the selected artery phase and the mode of area division of the k space on one screen and displaying them on the display 20 (Fig. 8), for example.

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Please modify the paragraph bridging pages 38 and 39, in the following manner:

The pulse sequence is activated and the dynamic measurement is started in the same way as in Fig. 2. The contrast medium is injected at an arbitrary timing to a predetermined blood vessel of the subject such as an elbow vein and the three-dimensional dynamic measurement is started. A known gradient echo pulse sequence such as the one shown in Fig. 9 is used for the pulse sequence. The k space is divided into three areas, that is, the high repetitive-frequency measurement area B containing the origin and the low repetitive-frequency measurement areas A and C not containing the origin by the plane Kx-kz defined by the read direction (Kx) and the slice encode direction (Kz) as shown in Fig. 1a, for example. In this embodiment, however, each measurement area is measured in a predetermined sequence until the dynamic measurement is completed. The measurement sequence of each area can be set to [[A]] B(551) → [[B]] A(552) → [[C]] B(553) → [[B]] C(554) →[[A]] B(555) → [[B]] A(556) → [[C]] B(557) → [[B]] C(558) → [[A]] B(559) → [[B]] A(560) ... for example. In this case, the time phase evaluation values 501, 502, 503, 504, 505, and so forth, can be acquired. In this measurement sequence, the high repetitive-frequency measurement area B is measured twice as often as the low repetitive-frequency measurement areas A and C and each low repetitive-frequency measurement area A, C is uniformly measured in the same way as in Fig. 2(a).

Please modify the paragraph bridging pages 40 and 41, in the following manner:

In Fig. 5a, the time phase of the timing at which the time phase evaluation value reaches the threshold value α(101) is in agreement with the time phase of the time phase evaluation value 504 acquired from the high frequency measurement area B(557). Therefore, this high repetitive-frequency measurement area B(557) and the low repetitive-frequency measurement areas A(556) and B(558) C(558) close time-wise to this high repetitive-frequency measurement area B(557) and constituting other areas of the k space are selected and [A(556), B(557), C(558)] is regarded as the image reconstruction set. The k space data is extracted and image reconstruction is made to display the two-dimensional projection image.

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Please modify the paragraph at page 42, lines 8-16, in the following manner:

In the second embodiment, too, as in the first embodiment the threshold valueα(101) or the start timing [[102]] 120 of the artery phase is directly changed or designated on the graph 201 after the dynamic measurement is completed and the measurement areas can be selected in accordance with the change or designation. Alternatively, the set of the measurement areas for image reconstruction can be selected from the rectangles of the measurement areas displayed on the display 20 by using the track ball or mouse 23, for example.

Please modify the paragraph at page 44, lines 15-16, in the following manner:

In Step [[709]] 708, image obtained in Step 707 is displayed on the display and is trace-read.